



**AMENDMENTS TO THE CLAIMS:**

This listing of claims will replace all prior versions, and listings, of claims in the application:

1. (Currently Amended) A method of transmitting ~~data~~data stream of packets from a server computer to a client computer over a communications network, ~~the data~~said stream of packets being routed between the server and client computers by a packet network node;

the packet network node having an input to receive ~~data~~said stream of packets from the server computer, the input being connected to first and second ~~buffer elements~~packet queues, said ~~buffer elements~~packet queues being connected to an output channel of predetermined bandwidth, wherein the first ~~buffer element~~ packet queue is preferentially allocated a portion of ~~the~~an output bandwidth and the second ~~buffer element~~packet queue is allocated a remaining portion of the output bandwidth such that packets received in the first ~~buffer element~~packet queue are transmitted in preference to packets received in the second ~~buffer element~~packet queue; the method comprising:

(i) transmitting ~~data~~packets in said stream of packets from the server computer to the client computer ~~using~~via the first ~~buffer element~~packet queue of the network node; and

(ii) upon receipt by the server computer of a first control signal from the client computer, transmitting ~~data~~subsequent packets in said stream of packets from the server

computer to the client computer ~~using~~via the second ~~buffer element~~packet queue of the network node.

2. (Currently Amended) A method of transmitting ~~dataa~~a stream of packets from a server computer to a client computer as in claim 1, wherein the method comprises the further step of

(iii) reverting to transmitting ~~datapackets~~in said stream of packets from the server computer to the client computer using the first ~~buffer element~~packet queue of the network node upon receipt by the server computer of a second control signal from the client computer.

3. (Currently Amended) A method of transmitting ~~dataa~~a stream of packets from a server computer to a client computer as in claim 1, wherein the first control signal is generated by the client computer in response to ~~thea~~a level of data stored in a client computer data cache attaining a first, upper threshold value.

4. (Currently Amended) A method of transmitting ~~dataa~~a stream of packets from a server computer to a client computer as in claim 2, wherein the second control signal is generated by the client computer in response to ~~thea~~a level of data stored in a client computer data cache attaining a second threshold value which is lower than ~~thea~~a first threshold value.

5. (Currently Amended) A method of transmitting dataa stream of packets from a server computer to a client computer according to claim 1 wherein:

thea communications route between the server computer and the client computer comprises more than one network node; and

thea selection of either the first or the second buffer-elementspacket queues in response to a control signal occurs within one or more of the network nodes which comprise the communications route between the server computer and the client computer.

6. (Currently Amended) A data-carrier tangible computer program storage medium containing computer executable code for loading into aat least one computer acting at least as said server computer for the performance of the method of claim 1.

7. (Currently Amended) A method of receiving dataa stream of packets at a client computer from a server computer, the dataa stream of packets being routed over a communications network by a network node;

the network node having an input to receive datapackets in said stream from the server computer, the input being connected to first and second buffer-elementspacket queues, said buffer-elementspacket queues being connected to an output channel of predetermined bandwidth, wherein the first buffer-elementpacket queue is preferentially allocated a portion of thean output bandwidth and the second buffer-elementpacket queue is allocated a remaining portion of the output bandwidth such that packets received in the

first ~~buffer element~~packet queue are transmitted in preference to packets received in the second ~~buffer element~~packet queue; the method consisting of:

- (i) the client computer receiving ~~data~~packets in said stream of packets from the server computer via the first ~~buffer element~~packet queue of the network node; and
- (ii) the client computer receiving ~~data~~subsequent packets in said stream of packets from the server computer via the second ~~buffer element~~packet queue of the network node in response to the transmission of a first control signal from the client computer to the server computer.

8. (Currently Amended) A method of receiving ~~data~~a stream of packets at a client computer from a server computer as in claim 7, wherein the method includes the additional step of

- (iii) the client computer receiving ~~data~~packets in said stream of packets from the server computer via the first ~~buffer element~~packet queue of the network node in response to the transmission of a second control signal from the client computer to the server computer.

9. (Currently Amended) A method of receiving ~~data~~a stream of packets at a client computer from a server computer as in claim 7, wherein the first control signal is generated by the client computer in response to ~~the~~a level of data stored in a client computer data cache attaining a first, upper threshold value.

10. (Currently Amended) A method of receiving dataa stream of packets at a client computer from a server computer as in claim 8, wherein the second control signal is generated by a client computer in response to thea level of data stored in a client computer data cache attaining a second threshold value which is lower than thea first threshold value.

11. (Currently Amended) A method of receiving dataa stream of packets at a client computer from a server computer as in claim 7, wherein:

thea communications route between the server computer and the client computer comprises more than one network node; and

thea selection of either the first or the second buffer elementspacket queues in response to a control signal occurs within one or more of the network nodes which comprise the communications route between the server computer and the client computer.

12. (Currently Amended) A data-carriertangible computer program storage medium containing computer executable code for loading into aat least one computer acting at least as said server computer for the performance of claim 7.

13 - 14. Cancelled.

15. (Currently Amended) A server computer for transmitting dataa stream of packets to a client computer over a communications network, the dataa stream of packets being routed between the server and client computers by a network node;

the network node having an input to receive ~~data~~said stream of packets from the server computer, the input being connected to first and second ~~buffer element~~packet queues said ~~buffer element~~packet queues being connected to an output channel of predetermined bandwidth, wherein the first ~~buffer element~~packet queue is preferentially allocated a portion of the ~~an~~ output bandwidth and the second ~~buffer element~~ packet queue is allocated a remaining portion of the output bandwidth such that packets received in the first ~~buffer element~~packet queue are transmitted in preference to packets received in the second ~~buffer element~~packet queue;

(i) means for transmitting ~~data~~packets in said stream of packets from the server computer to the client computer using the first ~~buffer element~~packet queue of the network node; and

(ii) means for transmitting ~~data~~subsequent packets in said stream of packets from the server computer to the client computer using the second ~~buffer element~~packet queue of the network node upon receipt by the server computer of a first control signal from the client computer.

16. (Currently Amended) A server computer as in claim 15 further comprising:

(iii) means for reverting to transmitting ~~data~~packets in said stream of packets from the server computer to the client computer using the first ~~buffer element~~packet queue of the network node upon receipt by the server computer of a second control signal from the client computer.

17. (Currently Amended) A server computer as in claim 15 wherein the first control signal is generated by the client computer in response to ~~the~~a level of data stored in a client computer data cache attaining a first, upper threshold value.

18. (Currently Amended) A server computer as in claim 16 wherein the second control signal is generated by the client computer in response to ~~the~~a level of data stored in a client computer data cache attaining a second threshold value which is lower than ~~the~~a first threshold value.

19. (Currently Amended) A server computer as in claim 15 wherein:  
~~the~~a communications route between the server computer and the client computer comprises more than one network node; and  
~~the~~a selection of either the first or the second ~~buffer elements~~packet queues in response to a control signal occurs within one or more of the network nodes which comprise the communications route between the server computer and the client computer.

20. (New) A method as in claim 1 wherein:  
packets received at the network node are directed to said first or second packet queues in dependence upon the presence of a first or second identifier respectively in said packets; and

said server computer transmits packets containing said first identifier prior to receiving said first control signal and after receiving said first control signal transmits packets containing said second identifier.

21. (New) A method as in claim 7 wherein:

packets received at the network node are directed to said first or second packet queues in dependence upon the presence of a first or second identifier respectively in said packets; and

said server computer transmits packets containing said first identifier prior to receiving said first control signal and after receiving said first control signal transmits packets containing said second identifier.

22. (New) A server computer as in claim 15 wherein:

packets received at the network node are directed to said first or second packet queues in dependence upon the presence of a first or second identifier respectively in said packets; and

said server computer transmits packets containing said first identifier prior to receiving said first control signal and after receiving said first control signal transmits packets containing said second identifier.